CLAIMS

1. A method of creating a visual presentation on a
substantially plane large surface by means of at least one
5   free-roaming marking device, **characterised by**
passing along at least one trajectory on said surface
with said free-roaming marking device, in such a way that
at least one contour line of said visual presentation is
passed on said surface, and
10   treating said surface along said at least one contour
line of said visual presentation by means of said free-
roaming marking device when passing along said at least one
trajectory.

15   2. The method according to claim 1, characterised in
that said treating step comprises marking said surface with
an exchangeable tool, wherein said tool is adapted to
deposit paint onto the surface and along said at least one
contour line.
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3. The method according to claim 1, characterised in
that said treating step comprises marking said surface with
an exchangeable tool, wherein said tool is adapted to
perform at least one task chosen from bending and/or
25   orienting and/or cutting grass blades in said surface.

4. The method according to any of the preceding
claims, characterised by subsequently treating at least one
interior or exterior area delineated by said contour lines
30   of said visual presentation on said surface.

5. The method according to claim 4, characterised by
treating said areas by means of said free-roaming marking
device.

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6. The method according to claim 4, characterised by manually treating said areas.

7. The method according to any of the preceding
claims, characterised by computing said trajectories from a source data representing said visual presentation, wherein
said source data is a computer data file representing said visual presentation, and
automatically transforming said computer file to instructions for said free-roaming marking device to pass along said trajectories for creating said visual presentation.

8. The method according to claim 7, characterised in that said computer data file is a vector graphics file.

9. The method according to claim 7, wherein said instructions comprise working operations of the free-roaming marking device comprising working order, direction, speed, trajectory track and start/stop positions of the free-roaming marking device, colour and marking on/off.

10. The method according to any of the preceding claims, characterised by
creating said visual presentation according to scale, and adapting said visual presentation to a viewing angle and/or viewing distance with respect to a position of an image capturing means in relation to said visual presentation on said surface.

11. The method according to claim 10, characterised by adapting the perspective of said visual presentation created on said surface to said viewing angle and distance, comprising adapting the visual presentation with regard to size, shape or contrast.

12. The method according to claim 10 or 11,
characterised in that the image capturing device is a TV-
camera.

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13. The method according to any of the preceding
claims, characterised in that said visual presentation is
an all-over visual presentation.

10   14. The method according to any of the preceding
claims, characterised in that the visual presentation is
selected from the group comprising: drawings or images
comprising logotypes or artwork.

15   15. The method according to any of the preceding
claims, characterised in that the free-roaming marking
device determines its position by means of a navigation
system.

20   16. The method according to claim 15, characterised
in that said navigation system is a laser scanner and/or a
GPS unit.

17. The method according to any of the preceding
25   claims, characterised in that said treating step comprises
marking said contour lines by depositing paint on said
surface and/or bending of grass along said contour lines.

18. The method according to any of the preceding
30   claims, characterised by the surface material being
selected from the group comprising: asphalt, concrete,
cement, stone, natural stone, a textile fabric, a synthetic
material, artificial surface material, rubber, metal, glass
blocks and grass.

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19. The method according to any of the preceding claims, wherein said surface being selected from the group comprising: an airport runway, a road surface, a roof surface, an athletic field surface, sports fields, outdoor
5   carpets, synthetic surfaces, artificial surfaces, container surfaces, wherein these surfaces are outdoor and/or indoor surfaces.

20. The method according to any of the preceding
10 claims wherein said surface is pre-treated with a foundation for formatting said surface.

21. A system for performing the method of claim 1 by generating visual presentations on large surfaces, said
15 system comprising
     a free-roaming marking device adapted to create said visual presentations by treating said surface, wherein
     said free-roaming marking device in use is adapted to pass along trajectories on said surface,
20   said free-roaming device comprising treatment means for treating said surface along contour lines of said visual presentation when passing along said trajectories, and
     calculation means for automatically calculating said
25 trajectories from a source data representing said visual presentation.

22. The system according to claim 21, further comprising a portable computing device for wireless
30 communication with the free-roaming marking device and for programming and controlling the free-roaming marking device on location where the visual presentation is to be created.

23. The system according to claim 22, further
35 comprising a remote computer for creating a master for said

visual presentation and wherein said master is transmitted
to said portable computing device for further processing.

24. The system according to claims 21 to 23, wherein
said free-roaming marking device automatically creates at
least one contour line of said visual presentation on said
large surface with said marking means.

25. The system according to claim 24, wherein said
marking means is at least one paint depositing nozzle.

26. The system according to claim 25, wherein said at
least one nozzle is arranged on a nozzle carrier on said
free-roaming marking device.

27. The system according to claim 26, wherein said
nozzle carrier is centrally arranged in relation to a
rotational centre of said free-roaming device or arranged
on a side of said free-roaming device.

28. The system according to claim 26, wherein said
nozzle carrier is arranged in front of or behind said free-
roaming device.

29. The system according to claim 21, wherein said
free-roaming marking device comprises a surface treatment
tool having an adjustable treatment direction and an
adjustable pressure onto said surface.

30. The system according to any of claims 21 to 29,
wherein said free-roaming marking device comprises a
navigation system.

31. The system according to claim 30, wherein said
navigation system is a laser scanner and/or a GPS unit.

32. A computer-readable medium having embodied thereon a computer program for processing by a computer for generating a visual presentation on a large surface

5   according to the method of claim 1, said computer program comprising a plurality of code segments, characterised by

a first code segment for computing trajectories along which a free-roaming marking device passes for creating said visual presentation, wherein said trajectories are

10   automatically computed from a source data representing said visual presentation.

33. The computer-readable medium according to claim 32, further characterised by

15   a second code segment for instructing said free-roaming marking device to pass along trajectories on said surface in such a way that at least one contour line of said visual presentation is created on said large surface by treating said surface along contour lines of said visual

20   presentation with said free-roaming marking device when passing along said trajectories.

34. Use of a mobile robot as a free-roaming marking device for performing the method according to claim 1, by

25   generating a visual presentation on a large surface, wherein said mobile robot is instructed to pass along trajectories, and

said visual presentation is created on said surface as a sum of said trajectories, wherein at least one contour

30   line of said visual presentation is created on said surface by

treating said surface along contour lines of said visual presentation with said free-roaming marking device when passing along said trajectories.

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35. Use of a mobile robot according to claim 34,
wherein said trajectories are automatically calculated from
a computer data file comprising a graphics file storing
said visual information of said visual presentation.

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